# BIOS ENGINEERING



**DATE:** March 31, 2005

PRODUCT: Bonanza Standard BIOS

# P34-0125 (P34, build 0125)

### About This Release:

- March 31, 2005
- BZ87510A.86A.0125.P34.0503312215
- UNDI 4.1.16
- CPU Patches: M04F2001, M04F2101, M04F2308, M04F241E, M04F252B, M04F2737, M04F292E, M0DF320A, M0DF330B, M1DF3414, M9DF4112

#### New Fixes/Features:

- Banner changed.
- Fixed system hang up after several resets.
- Updated latest processor patches.

# P33-0123 (P33, build 0123)

## About This Release:

December 1, 2004 BZ87510A.86A.0123.P33.0412011950 New database, flash 5 and flex BIOS UNDI 4.1.16 Tanacross UNDI 1.2.26

#### New Fixes/Features:

• Fixed intermittent hang issue during AC cycling.

# P32-0120 (P32, build 0120)

## About This Release:

November 23, 2004 BZ87510A.86A.0120.P32.0411231258 New database, flash 5 and flex BIOS UNDI 4.1.16 Tanacross UNDI 1.2.26

### New Fixes/Features:

• Fixed issue where there is no video after pressing F12 as soon as the keyboard lights blink during POST.

<sup>\*</sup> Other names and brands may be claimed as the property of others

- Fixed issue where there is no video when the AGP Aperture is set to 32MB or less.
- · Updated manufacturing default for USB Boot default to Disabled.

## P31-0118 (P31, build 0118)

#### About This Release:

```
November 8, 2004
BZ87510A.86A.0118.P31.0411080125
New database, flash 5 and flex BIOS
UNDI 4.1.16
UNDI 1.2.26
```

#### New Fixes/Features:

- Updated PXE UNDI to v4.1.16 and UNDI to v1.2.26
- · Fixed issue where PCI IRQ was not configured correctly for PCI slots
- Fixed issues where SATA drive in Port 0 is undetected when LAN is set to disabled
- Fixed CMOS lock/hide functionality in Intel® Integrator Tool Kit
- Fixed issues with 2X PCI memory and I/O space allocations
- Fixed "DPSD default logo" issue

## P30-0112 (P30, build 0112)

## About This Release:

```
October 12, 2004
BZ87510A.86A.0112.P30.0410120947
New database, flash 5 and flex BIOS
UNDI 4.1.10
UNDI 1.2.10
```

# New Fixes/Features:

- Fixed PS/2 device drop if user presses reset button during S1 sleep
- Fixed system hang when executing Intel® Integrator Tool Kit in VM86 mode
- · Added feature to enable VPD cloning for Intel® Integrator Tool Kit

# P27-0106 (P27, build 0106)

#### About This Release:

```
June 28, 2004
BZ87510A.86A.0106.P27.0406281338
UNDI 4.1.10
Tanacross UNDI 1.2.10
```

# New Fixes/Features:

• Added support for latest Intel® processors.

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• Fixed issue with Intel® Desktop Control Center and AGP/PCI Burn-in Mode set to non-default value.

## P26-0104 (P26, build 0104)

## About This Release:

```
June 21, 2004
BZ87510A.86A.0104.P26.0406210900
UNDI 4.1.10
Tanacross* UNDI 1.2.10
```

#### New Fixes/Features:

 Updated Intel® Desktop Control Center BIOS support for additional products.

## P25-0102 (P25, build 0102)

## About This Release:

```
June 1, 2004
BZ87510A.86A.0102.P25.0406011350
UNDI 4.1.10
Tanacross* UNDI 1.2.10
```

## New Fixes/Features:

- Add POST beep codes when video card is not detected.
- Added "Wake on PS/2 Mouse from S3" setup option to allow user to Enable/Disable wake from PS/2 Mouse from S3.
- $\bullet$   $\,$  Fixed hang issue with rapid mouse activity when entering S1 or S3  $\,$

#### P24-0100 (P24, build 0100)

## About This Release:

```
April 30, 2004
BZ87510A.86A.0100.P24.0404301129
UNDI 4.1.10
Tanacross* UNDI 1.2.10
```

## New Fixes/Features:

- Fixed issue where  ${\tt Intel} @ {\tt Celeron} ~ {\tt Badge} ~ {\tt was} ~ {\tt not} ~ {\tt displayed} ~ {\tt with} ~ {\tt latest} ~ {\tt CPU's.}$
- Fixed hang issue with OEM Splash logo
- Added support for latest Intel® Pentium 4 processor.
- · Added Russian, Korean, Simplified Chinese language module support.

## P23-0097 (P23, build 0097)

## About This Release:

```
March 31, 2004
BZ87510A.86A.0097.P23.0403310944
UNDI 4.1.10
```

<sup>\*</sup> Other names and brands may be claimed as the property of others

#### New Fixes/Features:

- Added USB Disable option in BIOS Setup.
- Added support for latest Intel® Pentium 4 processor.
- · Fixed issue where system would hang with MFG Jumper installed.
- Updated system security by increasing length of supervisor and user passwords from 7 to 16 characters and moving the storage location of user and supervisor passwords out of system CMOS.

# P22-0093 (P22, build 0093)

## About This Release:

Feb 24, 2004 BZ87510A.86A.0093.P22.0402241027 UNDI 4.1.10 Gb LAN UNDI 1.2.10

#### New Fixes/Features:

• Fixed an issue with FCS (Fast Chip Select) bit settings. This fix ensures that third party utilities display PAT mode as enabled.

## P21-0091 (P21, build 0091)

### About This Release:

Jan 29, 2004 BZ87510A.86A.0091.P21.0401291113 UNDI 4.1.10 Tanacross UNDI 1.2.10

#### New Fixes/Features:

- Updated ICH5R option ROM, to Intel(R) RAID for SATA v3.5.0.3003
- Fixed issue where a 'Disk Read Error Occurred' message was displayed after installing the Intel® Application Accelerator RAID Edition drivers, setting up RAID 0/RAID 1, and rebooting.
- Updated IDCC with T-Control Support.
- Fixed issue where memory timing values were not being displayed correctly in AUTO mode on IDCC terminal page.
- Updated ETK Version in SMBIOS to 1.01

# P20-0089 (P20, build 0089)

## About This Release:

Jan 21, 2004 BZ87510A.86A.0089.P20.0401211121 New database, flash 5 and flex BIOS UNDI 4.1.10

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Tanacross UNDI 1.2.10

#### New Fixes/Features:

• Fixed E7h POST hang issue after Windows restart.

# P19-0087 (P19, build 0087)

# About This Release:

Jan 14, 2003 BZ87510A.86A.0087.P19.0401141106 New database, flash 5 and flex BIOS UNDI 4.1.10 Tanacross UNDI 1.2.10

#### New Fixes/Features:

- Added SMSC Heceta 6 support.
- Added T-Control for future processors.
- Fixed issue where system would not complete POST if video card is not plugged in and a LAN card is present.
- Updated System Configuration Data to production level.

#### P18-0083 (P18, build 0083)

### About This Release:

December 12, 2003 BZ87510A.86A.0083.P18.0312121502 UNDI 4.1.10 LAN UNDI 1.2.10

#### New Fixes/Features:

- Fixed issue where system would hang at 03h when a FSB400 CPU is used on an ICS952638AF based board.
- Fixed issue where spread turns off when burn-in mode is set to -1% on an ICS952618BF based board.
- Fixed issue where PCI clocks will not turn on if PCI card was plugged in while the board was in S5 state on an ICS952638AF based board.
- Fixed an issue with an OEM manufacturing tool reporting a CMOS checksum error.
- Fixed issue where the Hyper-Threading option does not appear in Intel(r) Integrator Toolkit.
- Added support for Memory Voltage BIOS SETUP question in IDCC.
- · Added support for center spread clock mode detection in IDCC.

# P17-0081 (P17, build 0081)

# About This Release:

<sup>\*</sup> Other names and brands may be claimed as the property of others

November 24, 2003 BZ87510A.86A.0081.P17.0311241511 New database, flash 5 and flex BIOS UNDI 4.1.10 Tanacross UNDI 1.2.10

#### New Fixes/Features:

- BiM ETK Version updated to 2.1
- Fix an issue with Burn-in mode for -300 level boards.
- Fixed issue where entering the "Hardware Monitor screen" in BIOS setup will cause system hang if a certain 3<sup>rd</sup> party IDE Drive controller card is in PCI slot 3 and two IDE drives are attached to the controller.
- Fixed issue where system is unable to PXE boot if a particular  $3^{\rm rd}$  party IDE PCI card is installed.

## P16-0081 (P16, build 0076)

## About This Release:

October 24, 2003 BZ87510A.86A.0076.P16.0310241132 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

## New Fixes/Features:

• Additional IDCC support included.

# P15-0074 (P15, build 0074)

## About This Release:

October 23, 2003 BZ87510A.86A.0074.P15.0310230946 New database, flash 5 and flex BIOS UNDI 4.1.10 Tanacross UNDI 1.2.10

- Added support for IDCC (Intel Desktop Control Center)
- Added support for new unreleased processors
- Fixed an issue where system would not boot to PXE when a third party 256
   MB AGP Card is present
- Fix ECC initialization issue
- · Fixed issue where system would not log single or multi-bit ECC errors.
- · Added new advanced memory configuration page.
- Fixed issue where PCI clocks do not turn off when no cards installed
- · Updated thermal zone trip points.
- Updated system configuration data

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- Fix Japanese languages translations.
- Fixed issue where system would POST hang at AFh & 13h intermittently during AC power cycling.
- · Added a workaround to boot from OS recovery CD.
- $\bullet$  Fixed issue where system would hang at D4h when user enabled the memory timing override (user defined mode)

## P14-0068 (P14, build 0068)

#### About This Release:

September 16, 2003 BZ87510A.86A.0068.P14.0309162312 Flash 5 and flex BIOS UNDI 4.1.10 Tanacross UNDI 1.2.10

#### New Fixes/Features:

- Fixed the Blue Screen issue which was seen after a certain amount of OS resets.
- Added enhancement to flash update algorithm.
- · Added IDCC fan information.
- · Changed display of DDR333 to DDR320 when used with a 800MHz FSB processor.
- Fixed a system hang problem during POST with a Flash USB Flash card reader/writer.
- Fixed an issue where Power Button override when going into S3 caused system to hang on resume.
- Added IDCC Memory Extended Configuration information
- Updated 875 Memory reference code to version 1.4.
- · Reclaimed flash space by removing un-needed option ROM code.

# P12-0047 (P12, build 0047)

## About This Release:

August 21, 2003 BZ87510A.86A.0047.P12.0308210130 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

- · Added support to boot using future processors.
- Fixed issue where if IFLASH was performed right after VPD area update will cause system to hangs at POST code 55h.
- Fix issue where system will POST hang at 00h after setting manufacturing jumper due to VID been cleared to 00h.

<sup>\*</sup> Other names and brands may be claimed as the property of others

# P11-0045 (P11, build 0045)

#### About This Release:

August 19, 2003 BZ87510A.86A.0045.P11.0308191517 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

## New Fixes/Features:

- Added initial Desktop Control Center support.
- Added Flash5 Phase 2 support.
- · Moved BBS area from VPD block to backup block.
- Fixed issue where the PCI slot information silk screen on the board does not match with what is loaded into SMBIOS table.
- Added a work-around for IRQ sharing issue with a hard drive imaging application when in SATA native mode.
- Compressed the hex image to free-up boot block space. Moved Setup Client module to boot block to free-up space for main BIOS.
- Added functionality to flash update the BIOS in runtime using SMI without having to do a reboot to unlock the blocks. Both the methods are now supported and can be invoked from iFlash.
- Fixed two potential issues in boot block code.

# P10-0043 (P10, build 0043)

## About This Release:

August 15, 2003 BZ87510A.86A.0043.P10.0308151001 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

### New Fixes/Features:

- Fixed a system hang issue during POST with a Flash USB Flash card reader/writer.
- Added support to switch the display mode from the Logo to the BIOS text if an Option ROM for a PCI Mass Storage device is being executed.

## P09-0041 (P09, build 0041)

# About This Release:

July 22, 2003
BZ87510A.86A.0041.P09.0307221002
New database, flash 5 and flex BIOS
UNDI 4.1.10
LAN UNDI 1.2.10

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#### New Fixes/Features:

- Added the Intel(R) ICH5R RAID Option ROM version v3.5.0.2568.
- Changed the note, displayed under Fan Control Configuration, to "The new settings will not take effect until system is completely shut down".
- · Enhanced flash update algorithm to fix post code E9 hang issue.
- Intel® 875PE MCH BIOS Specification Update v1.4 & Memory Initialization Reference Code v1.3.
- Updated System Configuration Data
- Added error handling, Flash5 failed message during POST, lockdown the blocks
- Updated NWD F29 system configuration data
- Fixed display burn-in mode warning message during POST.

## P08-0038 (P08, build 0038)

#### About This Release:

June 24, 2003 BZ87510A.86A.0038.P08.0306241736 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

## New Fixes/Features:

- Added the ability to enable center spread-spectrum host clocking via BIOS setup option.
- Fixed issue where Event log failed to clear on a reboot using a custom CMOS utility.
- Addressed an issue where a synthetic stress utility froze due to an compatibility issue with USB legacy support.

# P07-0036 (P07, build 0036)

# About This Release:

June 17, 2003 BZ87510A.86A.0036.P07.0306170845 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

- Display "Processor Fan Speed", "Front Fan Speed", and "Rear Fan Speed" under "Hardware Monitoring" in the "Advanced" screen.
- Made the "RAID Enable/Disable" option a sub selection of the "Enhanced" SATA RAID selection. This means that RAID will only function in Enhanced Mode.
- Added ASF support for LAN
- Added faster ECC initialization support to shorten system POST time.

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- · Fixed the issue where ICH5 century byte makes system hang at post code 20
- Fixed the issue where boot block failed to recovery when BIOS flash update failed
- · Added POST error message on a Flash update failure
- Added table for manual IRQ selection from CMOS setup
- · Lowered power consumption of LAN when system is in S5.
- Added text display capability on JPEG/BMP.
- · Added UserBinary support.
- Fixed an issue that caused a delay when booting to a floppy after attempting to boot to a non-bootable CD with two SATA drives attached.
- Fixed issue where Windows XP legacy-to-native IDE runtime mode switching was not functioning.
- Fixed issue where Event log fails to clear on a reboot using CMOS utility tool NCMOS.EXE.

## P06-0030 (P06, build 0030)

#### About This Release:

May 16, 2003 BZ87510A.86A.0030.P06.0305161505 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

#### New Fixes/Features:

- Fixed compatibility issues with some DDR-400 memory.
- · Fixed boot block fault tolerance test failure.
- Fixed multi-bit ECC errors not being logged.
- Fixed hardware monitoring such the rear fan is monitored instead of the VREG fan.
- · Improved audible progress tones to indicate BIOS update progress.
- Improved ECC options such that ECC Event logging defaults to disabled when non-ECC memory is installed and automatically enable ECC event logging when ECC memory is installed.
- Fix typo so "MHz" is displayed instead of "Mhz"
- Added fix to address CKE glitch issue during S0 to S3 transition.

## P05-0026 (P05, build 0026)

## About This Release:

April 23, 2003 BZ87510A.86A.0026.P05.0304231448 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

<sup>\*</sup> Other names and brands may be claimed as the property of others

- Updated BIOS support code for Intel ® Pentium 4 Processor with 800MHz system bus.
- Added in ability to flag SPD tolerant DIMM correction in setup with a "\*" (star) after the DIMM slot description.
- Fixed check point C9 hang issue.
- Fixed false memory test post time error message when no failures and when dual channel optimization message needs to appear.
- Fixed the issues with devices changing order in the boot list or being disabled when other devices are removed.
- Added support for Express BIOS Update 2.0.
- Fixed runtime Logo enable/disable issue
- JPEG image support now accessible by some OEMs.
- Fixed floppy disable issues
- Fixed issue where ABSCMOS not work correctly.
- Fixed SMBIOS Memory Data Test failure.

#### P04-0023 (P04, build 0023)

#### About This Release:

April 23, 2003 BZ87510A.86A.0026.P05.0304231448 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

## New Fixes/Features:

- Updated memory reference code to revision 1.2
- Resolved issue causing intermittent POST hangs

### P03-0021 (P03, build 0021)

## About This Release:

April 5, 2003 BZ87510A.86A.0021.P03.0304051502 New database, flash 5 and flex BIOS UNDI 4.1.10 LAN UNDI 1.2.10

- · Added language translations for Memory Mode: Single Channel and Dual Channel
- Fixed USB Zip drive emulation
- Enhanced SATA support for certain drives
- · Added the ability to recover from non-bootable CD media (ISO9660 format).
- Fixed issue some USB devices cause lockups at boot.
- · Added a workaround to ensure SATA drives operate in the correct mode.
- · Lowered power consumption of LAN when system is in S5.

<sup>\*</sup> Other names and brands may be claimed as the property of others

P02-0019 (Production 02, build 0019)

Initial Release

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